Message

From: Davis, Eva [Davis.Eva@epa.gov]
Sent: 6/15/2017 6:39:50 PM
To: Dan Pope [DPope@css-inc.com]; d'Almeida, Carolyn K. [dAlmeida.Carolyn@epa.gov]; Jennings, Eleanor [Eleanor.Jennings@parsons.com]
CC: Cosler, Doug [Doug.Cosler@TechLawInc.com]; Bo [bo@praxis-enviro.com]; Brasaemle, Karla [Karla.Brasaemle@TechLawInc.com]; Wayne Miller [Miller.Wayne@azdeq.gov]
Subject: RE: Draft Williams AFB Checklist, Version 10

Another bright yellow box I haven't seen you guys discussing yet:

EBR remedial goals include:

1) Depletion of COC concentrations (mole fractions) in on- and off-site LNAPL to the degree that the COC-depleted LNAPL cannot transfer COCs to groundwater above MCLs [< Is there "off-site" LNAPL ?]

2) Reduction of aqueous-phase COC concentrations in on- and off-site groundwater and soil to the degree that MNA could be expected (based on Regulatory Agency modeling) to reduce COCs in on- and off-site groundwater below MCLs within the ROD remedial timeframe. [< I added "soil" because most of the aqueous-phase SVOC mass, and almost half of the aqueous-phase benzene mass, is sorbed to the soil matrix; this allows us to evaluate rate-limited aqueous-phase diffusion of mass out of low-permeability zones]

Specific numerical metrics, milestones, and timelines (i.e., specific concentrations of COCs in LNAPL and groundwater on- and off-site, along with associated geochemical and microbiological data, at specific times after initial implementation of EBR, and of MNA) will be developed based on Regulatory Agency modeling efforts to guide remedial activities, evaluate success of the remedial approaches, and trigger contingency remedies if necessary.

From: Dan Pope [mailto:DPope@css-inc.com]
Sent: Thursday, June 15, 2017 1:36 PM
To: d'Almeida, Carolyn K. <dAlmeida.Carolyn@epa.gov>; Jennings, Eleanor <Eleanor.Jennings@parsons.com>
Cc: Davis, Eva <Davis.Eva@epa.gov>; Cosler, Doug <Doug.Cosler@TechLawInc.com>; Bo <bo@praxis-enviro.com>; Brasaemle, Karla <Karla.Brasaemle@TechLawInc.com>; Wayne Miller <Miller.Wayne@azdeq.gov>
Subject: RE: Draft Williams AFB Checklist, Version 10

Note that "these assumptions" now has no referent. The text discussing the assumptions was taken out.

Aid, not aide.

From: d'Almeida, Carolyn K. [mailto:dAlmeida.Carolyn@epa.gov]
Sent: Thursday, June 15, 2017 11:42 AM
To: Jennings, Eleanor
Cc: Davis, Eva; Dan Pope; Cosler, Doug; Bo; Brasaemle, Karla; Wayne Miller
Subject: RE: Draft Williams AFB Checklist, Version 10

Mozart was criticized for "too many notes". It's a beautiful composition, but sometimes the simplest tune can be most profound. How about:

~~The EBR modeling efforts conducted by the AF, while perhaps useful from an operational standpoint, do not~~ Please provide a sufficiently ~~extensive and~~ detailed evaluation of important factors determining the efficacy and rate of COC

biodegradation and depletion of COCs from the LNAPL source materials, incorporating . ~~For instance, the AF EBR modeling efforts assume instantaneous mass transfer of COCs from the LNAPL to groundwater, which likely significantly over-estimates actual rates of transfer of COCs, therefore leading to over-estimates of rates of COC depletion from the LNAPL. In addition, the AF EBR modeling efforts assumed site-wide uniformity of critical parameters (such as porosity) [< They actually did use several different permeability zones in their model; I think we can leave this sentence out]. AF did not provide~~ sensitivity analyses for evaluating the effect of these assumptions on remedial efficacy and timeframe scenarios to aide in evaluating the efficacy of the remedy. ~~. Therefore, the Regulatory Team has performed a detailed and extensive analysis and modeling effort to better capture the variability of physical, chemical and biological conditions across the site, and to show the range of likely and likelihood of possible remedial efficacy and timeframe outcomes of EBR and MNA~~ Please use our modeled Time of Remediation estimates provided on May 30, 2017 as a example. ST12 Joint agency EBR model cover letter.pdf; TOR Estimates_ST012_052217.pdf; BIONAPL_Box_Model_revised_04-27-2017_UWBZ.xls].

Line 26:
Modeling to date by the AF has not been sufficiently documented to allow an independent check on the results. Please see our previous comments (Techlaw memo dated March 24, emailed on April 11, 2017, and Time of Remediation estimates provided on May 30, 2017). ~~The Regulatory Agencies technical team has sent a list of these deficiencies to AF. The word deficiency might also create negative reaction. Rathe,r reference previous comments and specify what the modeling effort need to address.~~

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"Because a waste is a terrible thing to mind..."

From: Jennings, Eleanor [mailto:Eleanor.Jennings@parsons.com]
Sent: Thursday, June 15, 2017 6:58 AM
To: d'Almeida, Carolyn K. <dAlmeida.Carolyn@epa.gov>; Davis, Eva <Davis.Eva@epa.gov>
Cc: Steve Willis <steve@uxopro.com>; Wayne Miller <Miller.Wayne@azdeq.gov>
Subject: Draft Williams AFB Checklist, Version 10

Good morning, Carolyn and Eva

Attached is the latest version, which incorporates the comments that came in yesterday. Looking at the comments that came in, it didn't sound to me like final decisions had been reached on a few items. Thus, there are 5 cells that are still unresolved – all in the "additional comments" section, and most involving the modeling.

In an ideal world, a conference call should be able to allow for immediate communication between the team members (as opposed to email responses), and thus should be much faster at resolving these five items.

An idea would be to give the team this afternoon to take one last look at the checklist, with instructions that a call Friday (tomorrow) morning has the spoken goal of being the last of the discussion on the checklist, and after the call it will be considered to be in final form. In other words, speak now or forever hold your peace. ☺ This puts the entire team on notice that it's time to focus and resolve the remaining five items. Just a thought .... I'm just trying to balance getting the helpful input from the team with getting a finalized version to you and Lauren for distribution.

Take a look and let me know what you think.

Thanks,

E

Eleanor M. Jennings, M.S., PhD
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"Safety Isn't Expensive. It's Priceless."